

AMENDMENTS

In the Specification:

Please substitute the following paragraph for the paragraph at page 11, lines 8-22.

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If none of the mappings in the cache memory 72 identifies the address transmitted to the cache memory control 75 by the pipeline 62, then the cache memory control 75 determines that the data from the memory location identified by the foregoing address is not stored in cache memory 72. In response, the cache memory control 75 transmits a retrieval request to memory system manager 11252, which retrieves the data stored at the memory location identified by the foregoing address. This retrieved data is then stored in a cache line of the cache memory 72 by cache memory control 11775, and the cache memory control 11775 generates a new mapping indicating a correlation between this data value just stored in the cache memory 72 and the memory address from which the data value was retrieved. Then, the cache memory control 11775 overwrites this data value with the data value transmitted to the cache memory control 11775 from the pipeline 62. At some later time, the memory location identified by the foregoing address transmitted to the cache memory control 75 by the pipeline 62 is updated with the data value stored in the cache memory 75 and correlated with the foregoing address via the mappings in the cache memory 72.